

WHAT IS CLAIMED IS:

1. An optical head to be driven in a tracking direction with respect to an optical disc being rotated, the optical head comprising:

a light source for reading and writing data from/on the optical disc;

an optical block for supporting the light source thereon;

a condenser shifter including a condenser, a movable body, a base, a focus direction drive mechanism and a tracking direction drive mechanism, wherein the condenser is used to condense light, emitted from the light source, toward the optical disc, the movable body supports the condenser thereon, the base supports the movable body elastically such that the movable body is able to shift in a focus direction and in the tracking direction, the focus direction drive mechanism is provided to shift the movable body in the focus direction and the tracking direction drive mechanism is provided to shift the movable body in the tracking direction; and

a rotating mechanism for rotating the condenser shifter around a predetermined axis with respect to the optical block on at least one of a first plane, which is parallel to the tracking direction and perpendicular to the optical disc, and a second plane, which is perpendicular to the tracking direction.

2. The optical head of claim 1, wherein the rotating mechanism includes:

a drive source, which is supported by one of the condenser shifter and the optical block;

a drive shaft, which is driven by the drive source along an axis; and

a sliding portion, which is supported by the other of the condenser shifter and the optical block and which has a friction grip on the drive shaft,

wherein the drive source drives the drive shaft with the absolute value of its acceleration changed according to a direction in which the drive shaft is driven.

3. An optical head to be driven in a tracking direction with respect to an optical disc being rotated, the optical head comprising:

a light source for reading and writing data from/on the optical disc;

a condenser shifter including a condenser, a movable body, a base, a focus direction drive mechanism and a tracking direction drive mechanism, wherein the condenser is used to condense light, emitted from the light source, toward the optical disc, the movable body supports the condenser thereon, the base supports the movable body elastically such that the movable body is able to shift in a focus direction and in the

tracking direction, the focus direction drive mechanism is provided to shift the movable body in the focus direction and the tracking direction drive mechanism is provided to shift the movable body in the tracking direction;

an optical block for supporting the light source and the condenser shifter thereon;

a transporting mechanism for shifting the optical block in the tracking direction with respect to the optical disc; and

a rotating mechanism for rotating the optical block around a predetermined axis with respect to the transporting mechanism on at least one of a first plane, which is parallel to the tracking direction and perpendicular to the optical disc, and a second plane, which is perpendicular to the tracking direction.

4. The optical head of claim 3, wherein the rotating mechanism includes:

a drive source, which is supported by one of the optical block and the transporting mechanism;

a drive shaft, which is driven by the drive source along an axis; and

a sliding portion, which is supported by the other of the optical block and the transporting mechanism and which has a friction grip on the drive shaft,

wherein the drive source drives the drive shaft with the absolute value of its acceleration changed according to a direction in which the drive shaft is driven.

5. The optical head of claim 2 or 4, wherein the drive source includes a piezoelectric element.

6. The optical head of one of claims 1 to 5, wherein if the drive source drives the drive shaft at an acceleration of which the absolute value is equal to or smaller than a predetermined value, the sliding portion shifts along with the drive shaft, and

wherein if the drive source drives the drive shaft at an acceleration of which the absolute value exceeds the predetermined value, the sliding portion relatively slides with respect to the drive shaft.

7. The optical head of claim 6, wherein the drive source drives the drive shaft in a first direction at an acceleration of which the absolute value is equal to or smaller than the predetermined value and in a second direction, opposite to the first direction, at an acceleration of which the absolute value is greater than the predetermined value.

8. The optical head of claim 1 or 3, wherein the

rotating mechanism includes an ultrasonic motor, an electrostatic motor and a shape memory alloy.

9. The optical head of one of claims 1 to 8, wherein each of the focus direction and tracking direction drive mechanisms includes a magnet, which is fixed on the base, and a coil, which is provided for the movable body.

10. The optical head of claim 2, wherein the condenser shifter has a convex lower surface, which is received by the optical block.

11. An optical disc drive comprising:

a disc motor for driving an optical disc; and

the optical head defined by one of claims 1 to 10.